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In the claims:

1. (Original) A thermal control system for a light source of a vision system comprising:
 - a heater thermally coupled to the light source; and
 - a thermal sensor thermally coupled to the light source and generating a temperature signal;
 - a controller coupled to said heater and to said thermal sensor, said controller operating said heater when said temperature signal is below a temperature limit.
2. (Original) A system as in claim 1 further comprising:
 - a cooling assembly having a cooling device and being thermally coupled to the light source; and
 - a controller coupled to said cooling assembly and operating said cooling device when said temperature signal is above a minimum temperature limit.
3. (Original) A system as in claim 2 wherein said controller activates said cooling device before said temperature signal drifts above said minimum temperature limit.
4. (Original) A system as in claim 2 wherein said cooling assembly comprises:
 - a cooling fan in thermal communication with said light source;
 - said controller operating said cooling fan when said temperature signal is above said minimum temperature limit.
5. (Original) A system as in claim 4 wherein said cooling assembly comprises:
 - a heat sink thermally coupled to said light source; and
 - an air sleeve thermally coupled to said heat sink and said cooling fan;
 - said controller operating said cooling fan to circulate air across said heat sink.

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6. (Original) A system as in claim 5 further comprising a thermal coupler layer thermally coupled between said light source and said heat sink.
7. (Original) A system as in claim 2 wherein said controller controls cooling output and activation duration of said cooling device.
8. (Original) A system as in claim 2 wherein said controller controls an operating speed of said cooling device.
9. (Original) A system as in claim 1 wherein said heater is activated before said temperature signal drifts below a heater deactivation zone.
10. (Original) A system as in claim 1 wherein said controller controls thermal output and duration of said output of said heater.
11. (Original) A vision system of a vehicle comprising:
 - an illuminator assembly having a light source and generating an illumination beam;
 - a thermal control system thermally coupled to said illuminator assembly;
 - a receiver assembly generating an image signal in response to at least a reflected portion of said illumination beam; and
 - at least one controller controlling generation of said illumination beam and said image signal and thermally controlling operating range of said light source.
12. (Original) A vision system as in claim 11 wherein said illuminator assembly is configured to be mounted within the interior cabin of the vehicle.
13. (Original) A vision system as in claim 11 wherein said receiver assembly is configured to be mounted within the interior cabin of the vehicle.
14. (Original) A vision system as in claim 11 wherein said thermal control system comprises:
 - a heater thermally coupled to the light source; and

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a thermal sensor thermally coupled to the light source and generating a temperature signal;

a controller coupled to said heater and to said thermal sensor, said controller operating said heater when said temperature signal is below a maximum temperature limit.

15. (Original) A system as in claim 11 wherein said thermal control system comprises:

a cooling assembly having a cooling device and being thermally coupled to the light source;

a thermal sensor thermally coupled to the light source and generating a temperature signal; and

a controller coupled to said cooling assembly and to said thermal sensor and operating said cooling device when said temperature signal is above a minimum temperature limit.

16. (Original) A system as in claim 15 wherein said cooling assembly comprises:

a heat sink thermally coupled to said light source;

an air sleeve thermally coupled to said heat sink; and

a cooling fan thermally coupled to said air sleeve;

said controller operating said cooling fan when said temperature signal is above said minimum temperature limit.

17. (Original) A vision system as in claim 11 wherein said receiver assembly filters said at least a reflected portion to correspond with an operating range of said light source.

18. (Original) A vision system as in claim 11 wherein said illuminator assembly comprises a plurality of LEDs performing color mitigation.

19. (Original) A method of thermally controlling operating range of a light source of a vision system comprising:

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generating a temperature signal in response to temperature of the light source; and

heating the light source when said temperature signal is below a maximum temperature limit.

20. (Currently Amended) A method as in claim ~~[[18]]~~19 further comprising cooling the light source when said temperature signal is above a minimum temperature limit.

21. (Currently Amended) A method as in claim ~~[[19]]~~20 wherein cooling the light source comprises maintaining an operating wavelength of the light source to correspond with a filter range of a corresponding receiver.

22. (Currently Amended) A method as in claim ~~[[18]]~~19 wherein heating the light source comprises maintaining operating wavelength of the light source to correspond with a filter range of a corresponding receiver.